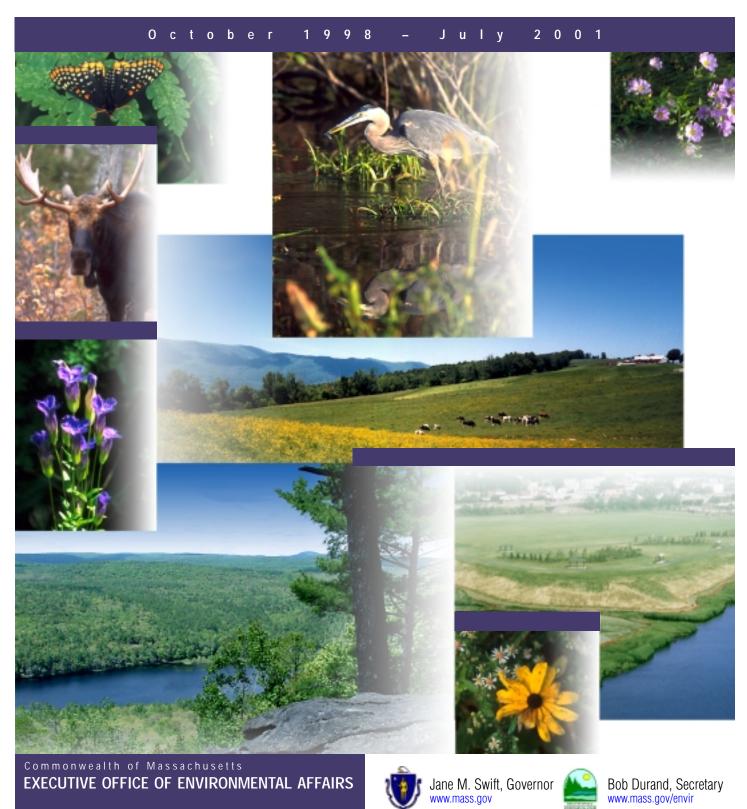
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Bob Durand, Secretary www.mass.gov/envir



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A Letter From Our Governor



Spring 2002

Dear Friend of the Environment,

Protecting open space is an essential component in preserving and enhancing the quality of life for the residents of Massachusetts. Open space – whether urban, suburban, or rural – serves a wide range of purposes that support our local economies and ensure a high quality of life.

Open space protection has also been the cornerstone of my Administration's environmental agenda. In October of 1998, we set an ambitious goal of protecting 200,000 acres of open space in the Commonwealth by 2010. In August 2001, less than three years later, I was proud to announce that we had reached the halfway mark in achieving that goal.

I am pleased to present this report that showcases some of the remarkable land protection efforts. The report also highlights, within the 100,000-acre milestone, the diverse partnerships we have built with our land trust community, municipal and federal partners, and local landowners who worked cooperatively with our state agencies to ensure that our most valued open spaces are preserved for future generations.

As we celebrate the protection of the first 100,000 acres, we also look forward to the protection of the next parcel, the next acre, and the next 100,000 acres, thereby preserving the quality of life in Massachusetts for our citizens and for future generations to come.

Sincerely,

Jane M. Swift

July L



An Introduction From Bob Durand



The Importance of Open Space in Our Communities

Protection of landscapes that represent our natural, historical, and cultural treasures is essential to our collective future and quality of life in Massachusetts. Whether the parcel is an historic landmark or a small field that simply enhances a rural road, open space helps our cities and towns prosper economically, offers much needed public space in our urban communities, and gives us a strong sense of place. In fact, open spaces help define our communities – just as much as a famous business, downtown, or an architecturally significant building – and are often the defining landmark of a community.

We must be careful, however, not to view open space solely as a mechanism against growth. In Massachusetts, our landscape encourages the natural and built environments to work in unison, not against one another. This model creates a unique, vibrant, and healthy place to live, work, play, and visit.

Over the past decade, the Commonwealth's residents have been challenged in new ways to protect those open spaces that define our distinctive New England heritage. The Massachusetts Audubon Society reports that Massachusetts loses 44 acres a day, or 16,000 acres annually to development, thus threatening the natural resources and rural character of our communities. While this may seem a small fraction of the state's 5.2 million acres, impacts from development are magnified when they are scattered throughout the state, fragmenting our landscape forever.

As we enter the 21st Century, it is critical that we take stock of our past accomplishments, reassert our core values, and commit ourselves to being stewards of the land in our cities and towns. Regardless of where you live, we all have a responsibility to continue the strong tradition of leaving future generations a lasting legacy of precious open spaces.

The Role of Partnerships

The key ingredient to the success of protecting 100,000 acres of open space in a short amount of time is the many land protection partnerships across the state. During the last three years the agencies within the Executive Office of Environmental Affairs (EOEA) have worked closely with the 140 private non-profit land trusts throughout the state, federal agencies, our Congressional Delegation, the State Legislature, Massachusetts cities and towns, and private landowners to give them the technical and financial resources necessary to help preserve and enhance the most valued landscapes in Massachusetts.

Partnerships have proven to be the most effective method to protect land. With today's increasing land values and a greater scarcity of open land across our state, it is critical that we all work together, sharing resources, to ensure our farmlands, forests, fields, scenic vistas, and historic landscapes are protected for future generations.

As a result of these valuable partnerships, the protection of 100,000 acres – or 2% of the whole state – was achieved in less than half the time required to reach the same milestone during the 1991-1998 period. Furthermore, these 100,000 acres cost the Commonwealth \$200 million dollars less than what was required to purchase the same quantity of acreage in the 1990s. This achievement is due to the millions of dollars that are added to state funds each year by land trusts, municipalities, federal agencies, and landowners, as well as an increased commitment to buying Conservation Restrictions (CR's) on properties throughout the state. EOEA will remain committed to open space protection and will work tirelessly to expand partnerships, allowing us to protect an additional one million acres over the next 20 years, thus creating a core open space network for the Commonwealth of Massachusetts.





An introduction to the 100,000 Acre Milestone

Massachusetts comprises 5.2 million acres state-wide

As of 2000, over 1.1 million acres of land has been developed

Additionally, 1.1 million acres is permanently protected open space

The remaining 3 million acres is unprotected or undeveloped and may be ready for development



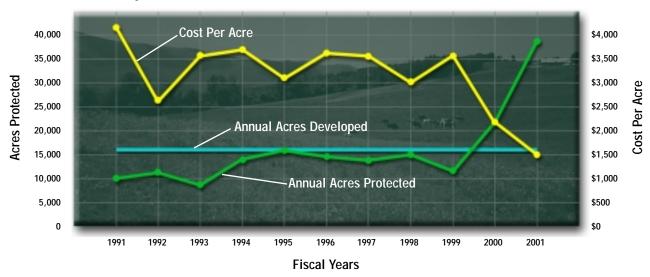


Fun Facts

- Massachusetts is blessed with more land trusts than any other state. Last year alone, land trusts protected more than 6,000 acres of land, without any assistance from EOEA.
- The 100,000-acre milestone was also possible due to a great increase in the number of gifts from private landowners. In FY 2001 alone, the state acquired 1,178 acres in gifts with a total estimated value of more than \$4 million. Added to this are the record 6,000 acres of conservation restrictions (CRs) approved by Secretary Durand in calendar year 2001 many of which represent gifts or are discounted in value to towns and land trusts.
- For the last two years, EOEA's Self-Help and Urban Self-Help Programs have awarded open space acquisition grants to every city and town with a viable project.
- In FY 2001, EOEA's \$6 million in Self-Help grants leveraged \$2 million in federal assistance and more than \$11 million raised by cities, towns, and land trusts.
- In FY 2001, DFA's Agricultural Preservation Restriction Program protected a record-breaking 4,653 acres of farmland at a cost of \$11.8 million to the state, which leveraged \$2.1 million in federal funds and \$6 million from cities, towns, and local land trusts.

- In FY 2001 alone, EOEA and its partners protected close to 50,000 acres—or 3 times the acreage of land that was developed during that same time period. That effort ensured that we have met the ambitious goal set by our 1998 report, *View from Borderland*, by protecting 3 acres for every acre developed.
- The total acreage in CRs doubled when compared to the 100,000 acres protected during the 1990s (approximately 26,000 acres in the 1990s and 53,000 acres in the current 100,000-acre milestone).
- FY 2001 was a record-breaking year for acreage protected by DEM (10,656 acres), DFWELE (11,920 acres) and DFA (4,755 acres).

Acres Protected & Cost Per Acre by Fiscal Year



Over the past three years, EOEA, its agencies, and non-profit partners have spent less per acre, while increasing the amount of land protected. This is a result of an increase in partnerships, greater utilization of Conservation Restrictions (CRs), and an increase in the number of gifts. This unique land protection approach has resulted in saving the taxpayers of the Commonwealth nearly \$200 million dollars when compared to the previous 100,000 acres projected between 1991 and 1998.

Methods Of Protecting Land

Fee simple acquisition:

Purchasing or accepting donation of the entire interest in a piece of property. To own land "in fee simple" means to have complete ownership of the land, with all the usual rights associated with ownership.

Conservation Restriction (CR) acquisition:

Purchasing or accepting donation of a partial interest in a piece of property. A CR (also known as a conservation easement) is a legal agreement between a landowner and a government agency or land trust that permanently protects open space by limiting future uses of the land, usually including the amount and type of development that can take place, but continues to leave the land in private ownership. The document conveys to the agency or land trust the right to monitor the property and enforce the terms of the agreement. When a landowner sells or donates a CR, s/he can continue to live on or work the land - in accordance with the CRs provisions - and can sell the land or pass it on to heirs. The CR is recorded with the property deed, and the terms of the agreement remain in place on the land even if the land changes ownership. The value of the property has been reduced by this process (by prohibiting development), which may lead to tax benefits.

Agricultural Preservation Restriction (APR) acquisition: An APR is a special type of CR which prohibits non-agricultural, non-open space use, or development of a parcel in order to preserve the land for agricultural purposes.

Note: Both CRs and APRs are authorized under Sections 31-33 of Chapter 184 of the General Laws of Massachusetts. By law, EOEA reviews and approves all CRs to assure that they will legally protect land. All land acquired by EOEA agencies (either in fee simple or by CR) is protected under Article 97 of the Amendments to the Massachusetts Constitution. Land protected by Article 97 requires a 2/3 vote of the Legislature before it can be disposed of.

There are many good reasons to conserve land in Massachusetts – protection of water resources, providing open spaces and parks for our urban communities, creating and enhancing outdoor recreation opportunities statewide, preserving working farms and forests, and protecting wildlife habitat. These reasons are critical in preserving and enhancing the quality of life in Massachusetts. Conservation of these resources largely depends on how wisely we use and manage our land.

Water Resources

Importance of preserving land for this resource:

- Critical to the environmental quality of the Commonwealth. Our rivers, lakes, ponds, and wetlands serve as the blood supply of the natural environment and support some of the most biologically diverse habitats in the state.
- Important to the economic health of the Commonwealth. Clean, abundant, and affordable water supplies allow communities to grow and businesses to flourish.
- Water is essential to the overall quality of life our communities enjoy. From coastal communities to the Housatonic River Valley, water resources are part of the heritage and identity of our communities.

Threats to this resource:

- Overuse of water is threatening water resources statewide. Some rivers and streams run dry during the summer and some lakes and ponds shrink in size as water levels are lowered because of high water use nearby. Balancing water needs and environmental protection is key to maintaining our water resources.
- While many of our rivers have made remarkable improvement in water quality since the passage of the Clean Water Act in the 1970s, many of our lakes and ponds still suffer from poor water quality. Algae blooms, invasive plants and bacterial pollution threaten our water resources.
- As of the summer of 2002, over 90 cities and towns face voluntary or mandatory water restrictions because high water demands overtax existing water systems. This can be a chronic problem in some communities, particularly those who have experienced large growth over the last decade.

How this 100,000-Acre Milestone helped advance protection of these resources:

- Over 39,670 acres of land were protected to preserve drinking water supplies throughout the state, including the 14,700-acre Massachusetts Military Reservation on Cape Cod.
- Additionally, EOEA, its agencies, and land protection partners, have worked to preserve an additional 9.7 miles of coastline, 127 miles of pond shorelines, and 166 miles of river shoreline. These acquisitions will provide much needed and wanted public access to the state's popular water bodies, in addition to providing significantly better water quality.
- Many of the acquisitions protect the headwaters of our state's rivers. These small streams are essential to the flow and quality of larger rivers. They represent three-quarters of all water-courses in the Commonwealth.

Why Do We Protect Land? Urban Parks

Importance of preserving land for this resource:

- Give urban youth positive experiences.
- Stimulate commercial growth and attract investment.
- Critical in bringing vitality, safety, and a sense of community to our urban neighborhoods.
- Provide cleaner air, water, and personal health for urban residents.
- Encourage the reuse of underutilized sites, keeping development in our urban core, rather than consuming our pristine greenfield sites.

Threats to this resource:

- Increased land values and competing uses make the acquisition of land for urban parks more challenging than in rural areas.
- An increasing amount of parks throughout our urban communities are showing signs of excessive usage and competing usages, all of which add to the overall deterioration of our parks, gardens, and playgrounds.

How this 100,000-Acre Milestone helped advance protection of these resources:

- The MDC spent just under \$7 million in land acquisition within the Boston Metro Region alone, adding 149 acres of passive and active land to the region's open space network.
- Between Fiscal Year 1999 and Fiscal Year 2001, the DCS distributed over \$8 million statewide in Urban Self-Help grants to communities for urban parkland acquisition, construction, renovation, and improvements.
- The City of Worcester worked with several groups to add over 100 acres to the Broad Meadow Brook Sanctuary, making it one of New England's largest urban preserves at nearly 300 acres. Since 1987, Worcester has protected over 70% of the "remaining open spaces" identified at that time. Cumulatively, the city has added over 900 acres to its open space network.

Outdoor Recreation Sites

Importance of preserving land for this resource:

- Provide opportunities for our families to experience nature firsthand, while also allowing new generations of environmental stewards to develop.
- Boost tourism, which had a 21.5 billion impact on the state's economy in 2000. Historical parks, beaches, and other outdoor parks all ranked in the four reasons United States residents visit Massachusetts.
- Open space preserved for recreation is more fiscally sound than unplanned development.

Threats to this resource:

- On Cape Cod, for example, if land development rates continue as they did during the 1990s, the region could reach buildout as early as 2023. Land fragmentation has complicated protection efforts to link existing trails and parks.
- Due to sprawl, many of our communities' landscapes are becoming more fragmented, thus making "large-scale" recreation trails, bike paths, and other uses more difficult to connect and preserve.
- Nearly half of the state's 351 cities and towns have completed open space plans with many parcels of land on their "critical" list to protect. For example, The City of Boston's current open space plan lists more than 1,900 acres of unprotected land inside city limits.

How this 100,000-Acre Milestone helped advance protection of these resources:

- EOEA has funded every viable Self-Help application in Fiscal Years 1999, 2000, and 2001.
- In the last four grant rounds EOEA has distributed 60 grants to 53 communities totaling over \$30 million.
- DEM and DFWELE have created entire new parks and reservations within the 100,000-acre milestone, such as the 209-acre Nasketucket Bay Reservation on the coast and the Southeastern Massachusetts Bioreserve.
- The 100,000-acre milestone protected many miles of regional and statewide trails.
- The 100,000 acres added 303 miles of rivers, coastline, and pond frontage—by far the most suggested need of surveyed park users.

Why Do We Protect Land? Working Farms And Forests

Importance of preserving land for this resource:

- Safeguard the future of local economies.
- Provide fresh, local products. On the average, Massachusetts' residents eat produce that has traveled over 1,500 miles.
- In 1997, Massachusetts was one of the nation's leading agricultural producers, ranking 7th in total agricultural cash receipts with \$377 million.
- Massachusetts' top agricultural products are fruits, nuts, and berries, all of which contribute significantly to the image of Massachusetts and are a popular attraction for visitors.

Threats to this resource:

- Between 1974 and 1997, the size of the average Massachusetts farm decreased 31% from 134 acres to 93 acres.
- Farmlands are often a magnet for development due to prime soils, level landscapes, and the lack of a new generation of farmers.
- About 55% of farms in Massachusetts have annual sales under \$10,000.
- In 1997, the average age of the Massachusetts farmer was 55.
- Since 1945, the number of farms declined in Massachusetts from 35,000 to 6,000.

How this 100,000-Acre Milestone helped advance protection of these resources:

- The state's successful APR Program purchased over 9,500 acres during this period, allowing farmers to keep their farms active and local economies strong.
- Approximately 25,000 acres were protected with the goal of keeping local forest industries active and vibrant.
- EOEA initiated a new working forest conservation restriction. Using this new tool, EOEA and its agencies acquired over 8,000 acres in the Tully Valley Private Forest Lands Initiative alone.

Biodiversity

Importance of preserving land for this resource:

- Plant, animal, and insect species are often a marker of the health of our environment, including humans.
- Hunting, fishing, bird watching, among many others, are all popular activities for our residents and visitors.
- Prevents the future endangerment of species.

Threats to this resource:

- The three biggest threats to biodiversity in Massachusetts are the destruction and fragmentation of wildlife habitats through development; pollution; and the introduction of invasive nonnative species.
- The percentage of rare or threatened species includes 13% of mammals; 15% of birds and flowering plants; 29% of amphibians; and 53% of reptiles. The regions with the most threatened species are Cape Cod, the Islands, and the Berkshires.
- The state's BioMap, which is the nation's first comprehensive mapping of core habitat areas for rare and endangered plants and animals found that the core habitat necessary for the long-term survival of 375 rare plant and animals species includes over 700,000 acres of unprotected land. The landscapes that support those species, also add up to an additional 700,000 acres of unprotected land.

How this 100,000-Acre Milestone helped advance protection of these resources:

- During this time period, over 47,000 acres of open space identified as "Core Habitat" in the BioMap was protected.
- An additional 27,000 acres of open space identified as "Supporting Natural Landscape" in the BioMap was protected.

Statewide Organizations:	The Trustees of Reservations, The Nature Conservancy, Massachusetts Audubon Society, New England Forestry Foundation, American Farmland Trust, The Conservation Fund, the Trust for Public Land, the New England Wildflower Society, and the Appalachian Mountain Club.
Regional Organizations:	Sudbury Valley Trustees, Compact of Cape Cod Conservation Trusts, Wildlands Trust of Southeastern Massachusetts, Essex County Greenbelt Association, Mount Grace Land Conservation Trust, Berkshire Natural Resources Council, Franklin Land Trust, Metacomet Land Trust, Opacum Land Trust, Orenda Wildlife Land Trust, Valley Land Fund, Upper Charles Conservation Trust, White Oak Land Conservation Trust, Coalition for Buzzard's Bay, The Norcross Wildlife Foundation, Inc., Bay Circuit Alliance, Cape Cod Commission, Martha's Vineyard Land Bank Commission, Cape Cod Land Bank, Hilltown Land Trust, Greater Worcester Land Trust, Nashua River Watershed Association, and the Essex County Trail Association.
Local Organizations:	More than 125 urban, suburban, and rural local land trusts.
State Agencies:	Department of Environmental Management (DEM), Department of Fisheries, Wildlife, and Environmental Law Enforcement (DFWELE), Department of Food and Agriculture (DFA), Metropolitan District Commission (MDC), and the Division of Conservation Services (DCS).
Federal Agencies:	U.S. Fish and Wildlife Service, National Park Service, National Resources Conservation Service, the U.S. Department of Agriculture, and the U.S. Forest Service.

The 351 cities and towns and thousands of private landowners.

Land Protection Through Partnerships



Santuit Pond was the largest parcel of unprotected land left on the Cape, until a partnership developed between state agencies and two municipalities to protect this land from future development. The property consists of 300 acres of woodlands, cranberry bogs, dense forests and a large pond. The land was protected with \$3 million from the DFWELE, \$3 million from the Town of Barnstable, and \$3 million from the Town of Mashpee.